Testimony: HB1190: Pesticides – PFAS Chemicals – Prohibition

Submitted to: The House Committee on Health & Government Operations

Submitted by: Steve McDaniel, McDaniel Honey Farm

Position: In Support

March 13, 2024

Dear Chair Pena-Melnyk, Vice Chair Cullison and Members of the Committee,

I am Steve McDaniel, a certified Master Beekeeper (one of about 150 in the U. S.), and Past President of the Maryland State Beekeepers Association, the Central Maryland Beekeepers Association, and the Carroll County Beekeepers Association. I have taught classes in beekeeping for many years at the Anne Arundel Beekeepers Association and other local associations. These groups represent over 2000 beekeepers throughout the state. I support **HB1190 Pesticides - PFAS Chemicals – Prohibition** and urge you to please vote for this critically needed bill. HB1190 will protect the health of our bees, and people, from needless PFAS pollution from pesticides that contain PFAS as their active ingredient.

Our bees are having a difficult time surviving in an environment that is saturated with poisonous chemicals, and PFAS are among the worst. A nation-wide survey by the Bee Informed Partnership from the University of Maryland finds that the annual loss of honey bee colonies in 2023 was 48.4%, the worst ever (10% would be normal). I would love to have only a 48% loss, as mine is currently 19 out of 20, or 95%, as it has been for most of the last decade, no matter how I try to protect my bees. Most of my beekeeping neighbors have been wiped out repeatedly, and have quit beekeeping. I am stubborn enough to buy new bees every year, when I can get them, though that is expensive. A surviving colony can produce 100 lb. of honey a year, a new one maybe 25 lb. average. At \$15/lb., that's a \$1,125 difference per colony per year, a loss of \$21,375 this year, plus \$3800 to restock!

A study on the effects of PFAS on bees published April 2021, found at a microscopically low concentration, 20 parts per billion, PFAS halts all brood-rearing in the colony. Killing the babies kills the colony, because honey bees only live about six weeks, and workers who die off must be constantly replaced. A typical colony of about 50,000 bees loses over 1000 workers a day to old age. Without new workers coming along, the colony is doomed. The population declines rapidly, and in a few weeks, the colony dies. At slightly higher concentrations, the bees die more quickly, and a colony may not last a day. As these toxins do not degrade in the environment, they continue to do damage forever.

These PFAS pesticides do not target a particular problem species but affect all living things and do not break down after use but last practically forever. Theoretically, one use should be enough, but they are often applied multiple times, such as when used for mosquitoes and are applied weekly in communities. And, these pesicides eventually wash away into streams, rivers and the Chesapeake Bay, where they poison crabs, oysters, and fish, and then go into the ocean. PFAS pesticides never should have been approved for use in the first place! For their intended purpose, killing problem insects, there are plenty of other less-toxic and shorter-lasting chemicals that work just as well.

PFAS chemicals will be with us for a long time even if we stop using them tomorrow, but we must stop adding to the problem by spreading them as pesticides every year. This is not a conservative or liberal, Republican or Democrat issue, but a simple case of using common sense to protect people's (and bees') health. Please vote for H.B. 1190. Let's make Maryland a healthier place so more of our citizens can make it to 100, as my mother-in-law recently did!

Stephen McDaniel